Application No. 10/625,633 Supplemental Amendment Dated February 10, 2011 Reply to Office Action dated August 31, 2010

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

- (Currently Amended) A patient physiologic monitoring assembly comprising:
 a plurality of sensors that generate a real-time physiologic data stream, said real-time
- physiologic data stream including a plurality of physiologic variables;
- a first logic rule set <u>for diagnosing a physiological condition of a patient, the first logic rule set</u> including a plurality of logic rules for interpreting the plurality of physiologic variables <u>of the</u> real-time physiologic data stream:
- a second logic rule set <u>for diagnosing the physiological condition of the patient, the second logic rule set</u> including a plurality of logic rules for interpreting the physiologic variables <u>of the real-time physiologic data stream</u>; and
- a controller that receives said real-time physiologic data stream as the data stream is generated, said controller including a logic that simultaneously cross references said plurality of physiologic variables of the real-time physiologic data stream with the first logic rule set and second logic rule set as the controller receives the real-time physiologic data system, and generates at least a first diagnostic interpretation of said plurality of physiologic variables utilizing said first logic rule set and a second diagnostic interpretation of said plurality of physiologic variables utilizing said second logic rule set;

wherein the first diagnostic interpretation and the second diagnostic interpretations are different diagnostic interpretations of the same physiological condition, using the same real-time physiologic data stream.

 (Previously Presented) A patient physiologic monitoring assembly as described in claim 1, wherein said logic is further adapted to display said first and second diagnostic interpretations on a display element. Application No. 10/625,633 Supplemental Amendment Dated February 10, 2011 Reply to Office Action dated August 31, 2010

 (Previously Presented) A patient physiologic monitoring assembly as described in claim 1, wherein said logic is further adapted to select said first logic rule set and said second logic rule set from a rules database, said rules database including a plurality of logic rule sets.

4. (Cancelled)

- (Previously Presented) A patient physiologic monitoring assembly as described in claim 3, wherein said logic is further adapted to modify one of said plurality of logic rules within said first logic rule set.
- (Previously Presented) A patient physiologic monitoring assembly as described in claim 5, wherein said logic edits one of said plurality of logic rules.
- (Previously Presented) A patient physiologic monitoring assembly as described in claim 5, wherein said logic deletes one of said plurality of logic rules.
- (Previously Presented) A patient physiologic monitoring assembly as described in claim 5, wherein said logic adds a new logic rule to said first logic rule set.
- (Previously Presented) A patient physiologic monitoring assembly as described in claim 3, wherein said logic is further adapted to add a new logic rule set to said rules database.
- 10. (Original) A patient physiologic monitoring assembly as described in claim 1, further comprising a plurality of networked medical facilities in communication with said controller such that said first logic rule set may be received from any of said plurality of networked medical facilities.

 (Currently Amended) A method for providing diagnostic aid to a clinician monitoring the medical condition of a patient, the method comprising:

storing a <u>plurality of sets of rule-based algorithms, including</u> a first and a second set of rulebased algorithms <u>on a data storage device</u>, the first and second sets of rule-based algorithms generating different diagnostic interpretations of the same physiological data <u>representative of the</u> <u>same physiological system</u>;

acquiring a physiological data stream from at least one sensor connected to the patient; identifying, with a logic of a controller, physiological data present in the physiological data stream;

selecting, with the logic of the controller, the first and second sets of rule-based algorithms that generate different diagnostic interpretations of the identified physiological data in the physiological data stream;

applying, with a-the logic of a-the controller, at least one rule-based algorithm from the first set of the rule-based algorithms to the aequired-physiological data stream as the physiological data stream is acquired:

generating a first diagnostic interpretation with the controller based on the application of the at least one rule-based algorithm from the first set to the acquired physiological data stream;

displaying the first diagnostic interpretation to the clinician;

applying with the logic at least one rule-based algorithm from the second set of rule-based algorithms to the acquired physiological data stream as the physiological data stream is acquired;

generating with the controller a second diagnostic interpretation based on the application of the at least one rule-based algorithm from the second set to the acquired physiological data stream; and

displaying the second diagnostic interpretation to the clinician.

12. - 27. (Cancelled)

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28. (Currently Amended) The method of claim 72, further comprising generating a certainty score for each of the general-first and second diagnostic interpretations, wherein the certainty score provides comparative information about the first and second diagnostic interpretations.

29. - 71. (Cancelled)

72. (Currently Amended) A method for diagnosing the medical condition of a patient, the method comprising:

acquiring at least one real-time physiological data stream:

identifying, with a logic operating on a controller, a physiological data present in the at least one real-time physiological data stream;

selecting, with the logic, a first rule set comprising rule-based algorithms directed to produce at least one first diagnostic interpretation of the physiological data;

selecting, with the logic, a second rule set comprising rule-based algorithms directed to produce at least one second diagnostic interpretation of the physiological data, wherein the first rule set and the second rule sets produce different diagnostic interpretations of the same identified physiological data;

applying, with a <u>the logic operating on a controller, a, the first rule set comprising a plurality</u>
of rule-based algorithms to the acquired at least one real-time physiological data stream, the first rule
set comprising rule-based algorithms directed as the at least one real-time physiological data stream
is acquired to producing produce at least one general-first diagnostic interpretation of the at least
one real-time physiological data stream based on the application of the first rule set;

evaluating with the logic the at least one general diagnostic interpretation to select a second rule-set comprising a plurality of rule-based algorithms directed to producing at least one specific diagnostic interpretation:

applying, with the logic, the selected-second rule set to the at least one real-time physiological data stream as the at least one real-time physiological data stream is acquired to

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<u>produce</u>; <u>generating with the logic</u> at least one specific-second diagnostic interpretation of the at least one real time physiological data stream based on the application of the second rule set; and displaying at least one of the generated specific the first and second diagnostic interpretations.

73. (Currently Amended) The method of claim 72 wherein at least one general diagnostic interpretation the physiological data identified in the at least one real-time physiological data stream identifies the cardiac system and the at least one specific-first and second diagnostic interpretation is interpretations are differing diagnosis of a specific-cardiological-condition conditions.

74. - 84. (Cancelled)

- 85. (New) The method of claim 72, wherein the at least one real-time physiological data stream is a plurality of real-time physiological data streams wherein each of the plurality of real-time physiological data streams monitor the same physiological system using different monitoring techniques.
- 86. (New) The method of claim 72, wherein the at least one real-time physiological data stream is a plurality of real-time physiological data streams wherein each of the plurality of real-time physiological data streams are from separate physiological systems of the patient.